

STATE OF NEW YORK DEPARTMENT OF PUBLIC SERVICE

THREE EMPIRE STATE PLAZA, ALBANY, NY 12223

PUBLIC SERVICE COMMISSION-

ER A. BRADFORD
Chairman
LISA ROSENBLUM
Deputy Chairman
HAROLD A. JERRY, JR.
WILLIAM D. COTTER
RAYMOND J. O'CONNOR



WILLIAM J. COWAN
General Counsel

JOHN J. KELLIHER
Secretary

PR 94-108

August 5, 1994

AUG 09 1994

William F. Caton, Acting Secretary
Federal Communications Commission
1919 M Street, NW
Washington, D.C. 20554

FCC MAIL ROOM

PR File No. 94-SP6

In the Matter of Implementation of Section 3 (n) and
332 of the Communications Act - Regulatory Treatment of
Mobile Service - GN Docket No. 93-2524

Dear Secretary Caton:

Enclosed please find an original and nine copies of the New York State Public Service Commission on petition to extend rate regulation.

Please return the attached notice of receipt.

Sincerely,

A handwritten signature in cursive script, appearing to read "Penny Rubin".

Penny Rubin
Assistant Counsel

Att.

Before The
Federal Communications Commission
Washington, D.C. 20054

AUG 09 1994

TOO MAIL ROOM

In the Matter of

IMPLEMENTATION OF SECTIONS 3 (n) and
332 of the COMMUNICATIONS ACT

REGULATORY TREATMENT of MOBILE SERVICES

PR 94-108
GN DOCKET NO. ~~93-2524~~

PETITION TO EXTEND RATE REGULATION

WILLIAM J. COWAN
General Counsel
Public Service Commission,
State of New York
Three Empire State Plaza
Albany, NY 12223-1350

Of Counsel
Penny Rubin

DATED: August 5, 1994
Albany, New York

TABLE OF CONTENTS

	<u>Page</u>
PETITION TO EXTEND RATE REGULATION	1
BACKGROUND	1
INTRODUCTION AND SUMMARY	2
I. THE CELLULAR MARKET IN NEW YORK	5
II. RATE REGULATION OF CELLULAR CARRIERS IN NEW YORK	6
III. RATES, REVENUES, RETURN ON COMMON EQUITY, AND CONSUMER COMPLAINTS	7
A. Rates and Revenues	8
B. Return on Common Equity	8
C. Market Share	9
D. Consumer Complaints	9
IV. ANTICOMPETITIVE AND DISCRIMINATORY PRACTICES OF CELLULAR CARRIERS	10
CONCLUSION	12

Before The
Federal Communications Commission
Washington, D.C. 20054

In the Matter of

IMPLEMENTATION OF SECTIONS 3 (n) and)	
332 of the COMMUNICATIONS ACT)	GN DOCKET NO. 93-2524
)	
REGULATORY TREATMENT of MOBILE SERVICES)	

PETITION TO EXTEND RATE REGULATION

The New York State Public Service Commission (NYPSC) hereby petitions The Federal Communications Commission (Commission), pursuant to 47 C.F.R. §§ 20.13, for authority to continue to regulate the rates of Commercial Mobile Radio Service (CMRS) Providers operating in New York. The NYPSC is the duly authorized New York State agency responsible for the regulation of intrastate telecommunications services.

Background

On August 10, 1993, the Omnibus Budget Reconciliation Act of 1993 (the Act), amending Section 332(c)(3) of the Communications Act, was signed into law. The Act preempts state and local rate and entry regulation of commercial mobile radio services (CMRS), effective August 10, 1994. Under Section 332(c)(3)(B), however, any state that regulates the rates of CMRS providers, effective June 1, 1993, may petition the Commission to extend that authority based on a showing that (1) "market conditions with respect to such services fail to protect subscribers adequately from unjust and unreasonable rates or

rates that are unjustly or unreasonably discriminatory;" or (2) "such market conditions exist and such service is a replacement for land line telephone exchange service for a substantial portion of the telephone land line exchange service within such state." 47 U.S.C. § 332(c)(3)(A).

On March 7, 1994, the Commission issued the Second Report and Order in the above-captioned proceeding establishing the requirements for state petitions. In the Order, the Commission stated that its goal is to ensure that "unwarranted regulatory burdens" are not imposed on CMRS providers and that its preemption rules will help promote investment in the wireless infrastructure by "preventing burdensome and unnecessary state regulatory practices..."(para. 15 and 23)

Introduction and Summary

New York Public Service Law imposes upon the New York State Public Service Commission a non-discretionary statutory duty to regulate the rates of cellular telephone companies and resellers of cellular telephone service (both are CMRS providers under the Act).^{1/} Under State Law, market conditions with respect to Commercial Mobile Radio Services "fail to protect subscribers adequately from unjust and unreasonable rates or rates that are unjustly or unreasonably discriminatory".

We seek authority to continue to regulate cellular carriers providing intrastate cellular service in New York on the grounds that existing state rate regulation provides the necessary oversight to ensure that rates are just and reasonable

^{1/}New York Public Service Law Article V.

and that rates are not unjustly or unreasonably discriminatory. Most importantly, cellular rate regulation in New York is not an impediment to effective competition and will, in fact, result in more, rather than less, infrastructure investment in this State. As the Commission concludes, the market for cellular services is not fully competitive (Order, para. 138) and, therefore, state rate regulation, as it is employed in New York, serves as a deterrence to anticompetitive and discriminatory practices.

The benefits of effective competition occur largely because the market can control each provider's actions. Effective competition requires strong mutual pressure on firms to perform well (by minimizing costs, by holding prices down to these costs, by providing good service quality and by innovating rapidly) in order to survive. However, in a market such as the cellular market, where there are only two providers of a service^{1/} and where there are currently no effective substitutes, actions taken by one firm may not result in a normal competitive reaction by the only other firm.^{2/}

^{1/}While there may be a myriad of resellers, it is the two underlying providers who set the floor for the prices charged by those resellers. While a reseller may price below cost for a short time, to be viable over the long term a reseller must price above cost.

^{2/}William G. Shepherd, Chair of the Department of Economics at the University of Massachusetts, warns against premature deregulation in such a situation, stating that "[u]nless effective competition can quickly be achieved when deregulation occurs, the deregulation will be irresponsible, often leading instead to entrenched dominance and inferior performance." William G. Shepherd, Reviving Regulation - and Antitrust, Electricity J., June 11, 1994 at 16, 19.

With but one real competitor in each market area, a cellular provider has less incentive to innovate or price competitively than it would in a multi-vendor market. Therefore, absent a fully competitive market, continued light rate regulation is required to ensure that rates do not become discriminatory, unjust or unreasonable.^{1/}

The facts presented below suggest that rates for cellular service are considerably higher than for local exchange telephone service and that the profits of some of the cellular carriers are extraordinarily high. In addition, there is evidence of high concentration within individual MSAs, and the increase in the use of cellular service suggests it is becoming an essential service for many segments of society. Moreover, while the customer complaint rate is relatively low, the number of complaints is increasing significantly. On the other hand, cellular rate levels do appear to be declining.

It is not surprising that the record is mixed. After all, the very purpose of New York regulation has been to prevent rates from becoming unjust and unreasonable and to prevent discriminatory and anticompetitive behavior. Removal of these regulatory safeguards may well have a detrimental effect on the reasonableness of rates and will provide these carriers with

^{1/}We are mindful that the Commission will forebear from rate regulation and that absent state oversight, there will be significantly less opportunity to monitor cellular practices. Although the Commission will not forebear from its Section 208 complaint resolution function, the fact that rates are not on file makes it substantially more difficult to detect problems and therefore for the Commission to resolve rate complaints.

increased incentive and opportunity to engage in discriminatory and anticompetitive practices.^{1/}

I. THE CELLULAR MARKET IN NEW YORK

New York State is divided into 17 Cellular Geographic Service Areas (CGSA), with 11 encompassing metropolitan and surrounding areas (MSAs) and 6 covering rural areas (RSAs). Each of these 17 areas is now served by two cellular companies, except for 1 RSA. There have been two certified cellular carriers in each of the metropolitan MSAs for at least nine years and in all of the RSAs, except for one, within the last three years.

Appendix 1

The New York City MSA is by far the largest (73% of total cellular revenues in the state). Another 20% of the revenues are divided among the four upstate metropolitan service areas (Albany, Buffalo, Rochester and Syracuse). The remaining 7% is spread among the other 12 cellular service areas. As of June 1994, there were approximately 32 resellers in New York.^{2/}

^{1/}We recognize that when PCS services are brought to the market they may provide a viable substitute for cellular service and therefore reduce the need for continued rate regulation of cellular carriers. However, full deregulation now without the requisite competition is unwarranted.

^{2/}Resellers are wholly dependent upon either of the two underlying carriers in any market area. The presence of multiple resellers does not itself indicate effective competition.

II. RATE REGULATION OF CELLULAR CARRIERS IN NEW YORK

Cellular regulation in New York provides a reasonable balance between advancing competition and protecting consumers against unjust and unreasonable rates. Under the rules and regulations of the New York State Public Service Commission, cellular carriers must file tariffs, but may establish minimum and maximum rates which become effective not less than 30 days from the filing (16 NYCRR 630).^{1/} In most instances, changes within the minimum and maximum range may become effective on as little as one day's notice to customers and the Commission. The combination of these rules allows carriers wide latitude in setting their initial rates and making changes to those rates in response to competitive forces and customer demand. Staff reviews these filings primarily to assure that carriers are not seeking to engage in discriminatory practices.

Only if a proposed rate change is above the currently approved maximum level, and would increase gross operating revenues by the greater of 2-1/2 per cent or \$100,000 is there a regulatory requirement in New York that evidentiary hearings be held which must be completed within 11 months. (Public Service Law § 92.2). There have been very few instances in which cellular rates have required hearings primarily because the NYPSC has allowed and even encouraged carriers to establish wide flexible rate minimum to maximum ranges.

^{1/}Typically these tariffs become effective within this period except in those rare instances in which the Commission does not meet within 30 days of the filing.

Cellular carriers also have obligations for basic consumer protections and for filing audited financial statements, and annual reports containing operating data, plant in service, liabilities, operating revenues and expenses. These and other requirements which do not prevent entry of new carriers will continue to be enforced regardless of the outcome of this proceeding. The Act specifically permits the states to set the terms and conditions of service. 47U.S.C § 332(C)(3)(A)

III. RATES, REVENUES, RETURN ON COMMON EQUITY, AND CONSUMER COMPLAINTS

Cellular carriers report their operating expenses and revenues, plant investment, and organizational and pricing information for the purpose of tracking the effectiveness of competition in New York. From these reports, the Staff of the Department of Public Service prepared a report on the status of cellular competition in New York in 1991 and 1992 and is in the process of completing the 1993 report.^{1/} The New York cellular companies have filed motions requesting that information contained in the report be treated as proprietary. Should the Commission require the specific information to make its determination, the company-specific information will be provided, pursuant to appropriate safeguards.

^{1/}Since approximately 93% of the 1992 New York State cellular telecommunications revenues were obtained in the five MSAs, the analysis focuses heavily upon the results of the ten carriers.

A. Rates and Revenues - Statewide cellular operating revenues in the six MSAs increased 20% from 1991 to 1992. On average, revenues per access number declined by 8% from 1991 to 1992. Airtime minutes of use increased by 24% and the number of access lines increased almost 30% during this period. Overall revenues per airtime minutes declined by 3% from 1991 to 1992. Due to the number of different rate plans offered by cellular companies and the changes in average customer usage patterns caused by continued growth, it is difficult to measure changes in price levels. On a broad basis, the declines in revenues per access number and revenues per airtime minute indicate that overall average prices are declining. However, the rates for cellular service remain considerably higher than comparable land line telephone services.^{1/} In the absence of a fully effective competitive market, it is essential that regulatory oversight remain in place in order to ensure that the affordability of cellular service continues to improve.

B. Return on Common Equity - In 1991, the return on common equity for those companies which provided information ranged from a high of 142% to a low of -42%. The average return was 47% for this period. In 1992, the returns ranged from 85% to a low of -118%, with an overall average return of 38.60%. In 1993, the returns, based on available data, ranged from a high of 79% to a

^{1/}A recent Merrill Lynch Cellular/Telecommunications Report, dated July 14, 1994, states that the average cellular rate per minute (including the monthly access fee) is nine times that of local rates.

low of 0% with the average return of approximately 38%. This compares to 10-15% returns on equity for high tech companies from 1991-1993. Appendix 2

While not dispositive of the competitiveness of the market, the returns of several of the companies are clearly higher than traditional regulated land line companies, and most unregulated high tech companies. These findings suggest that there is the potential for rates to become unjust and unreasonable, absent continued regulatory oversight.

C. Market Share - For 1991, market share, as evidenced by total revenues, was roughly equal in two MSAs. In each of three MSAs one company had 80% of the market and the other had 20%.

For 1992, in two MSAs one company had 70% of the market and the other had 30%. In one MSA, one company had 80% of the market share and the other had 20%. In the other two MSAs, market shares were split 50/50. This data may indicate that one company has a dominant position and that absent continued oversight could have the incentive and opportunity to engage in anticompetitive pricing.

D. Consumer Complaints - Over the 12-month period ending May 31, the NYPSC received 146 complaints against cellular companies. Sixty-six of those complaints were rate-related (excessive, erroneous, or disputed bills). The remaining 80 complaints were related to service quality and other non-rate matters. For 1991 and 1992, there were 77 consumer complaints which were not broken down into categories. While the complaint

rate is low, the absolute number of complaints has increased significantly, by close to 100%.

IV. ANTICOMPETITIVE AND DISCRIMINATORY PRACTICES OF CELLULAR CARRIERS

Requiring companies to file for rate changes and new rate plans (including promotional rates) provides the vehicle by which the Department of Public Service staff reviews any potential anticompetitive and discriminatory practices. The Department of Public Service staff in the Communications Division Tariff and Rates Section makes every attempt to resolve disputes and to advise carriers on how to correct tariff language that is discriminatory on its face.

Staff informally proposes that the carrier make changes to the tariff prior to formally recommending that a rate proposal be rejected or suspended for further investigation. Recently, for example, a cellular company proposed a special pricing plan for associations having more than 4,000 members in law enforcement or crime prevention. Staff of the Department worked with the cellular company on this discriminatory pricing plan, and the result was that the plan was withdrawn. Continued regulation is therefore necessary to ensure a seamless network and access to emergency services.

More recently, the New York Public Service Commission and Staff were needed to resolve a dispute between two cellular companies regarding roaming rates. The Commission took the rare but necessary step of ordering the two companies to enter into an

interim roaming agreement, at a compensation schedule proposed by Department staff, after a year of negotiations had failed to bring about an agreed upon roaming rate. The Commission determined that the safety of cellular customers was compromised by actions taken by the company which blocked access to 911 and other emergency services while its customers were roaming in the other carrier's service territory. Appendix 3

While interconnection between carriers is the subject of another proceeding,^{1/} this problem reflects the importance of state regulators having the authority to step in and resolve disputes which arise out of their rate authority which could have a significant impact on health and safety.^{2/}

Conclusion

The rate regulation exercised by the State of New York is consistent with the goals of Congress and the Commission. Continued rate regulation of cellular carriers will not place unwarranted regulatory burdens on cellular carriers nor will it act as an impediment to wireless infrastructure investment. The opposite is true. New York's continuing regulation will serve to

^{1/}See, In the Matter of Equal Access and Interconnection Obligations Pertaining to Commercial Mobile Radio Services, Notice of Proposed Rulemaking and Notice of Inquiry, Released July 1, 1994.

^{2/} As we argued in our May 13, 1994 Petition for Reconsideration of the Order, the Commission does not have authority to regulate intrastate interconnection rates between cellular carriers. Even if it is determined that the Commission does have that authority, continued rate regulation is required to prevent unreasonable and discriminatory rates and practices, as this example suggests.

protect competitive opportunities and infrastructure investment. The dispute resolution function performed by the Commission and the Department Staff has played a major role in avoiding those practices which threaten vigorous competition in the wireless market.

Continuing state rate oversight will also serve to continue to deter unreasonable practices. Denial of this petition will mean that consumers in New York will have no immediate recourse to address their concerns. Consumers will have two choices--they can continue to take service being provided by one of two underlying carriers at unreasonable rates or they can stop taking the service altogether. As the problems of crime and violence reach the highways and streets, more and more people are using cellular phones as an added source of safety. No longer can a consumer, who is dissatisfied with rate or discriminatory practices, easily decide to forego this service.

The Commission would be wise to recognize that to wait until New York can establish that there are major problems before allowing it to regulate cellular carriers is not the solution. As has been learned from the cable industry, it is far more difficult to correct problems once they exist, than it is to

maintain mechanisms which will prevent unreasonable or unlawful conduct from occurring in the first place.

For all of the foregoing reasons, the petition should be granted.

Respectfully submitted,



WILLIAM J. COWAN
General Counsel
Public Service Commission,
State of New York
Three Empire State Plaza
Albany, NY 12223-1350

Of Counsel
Penny Rubin

DATED: August 5, 1994
Albany, New York

**NEW YORK PUBLIC SERVICE COMMISSION
CERTIFICATION DATES BY SERVING AREA**

SERVING AREA	WIRELINE COMPANY	NON-WIRELINE COMPANY
ALBANY	January 1985	May 1985
BINGHAMTON	November 1987	April 1987
BUFFALO	January 1985	September 1983
ELMIRA	March 1988	March 1988
GLENS FALLS	January 1985	May 1985
ORANGE COUNTY	August 1987	June 1988
POUGHKEEPSIE	August 1987	August 1987
ROCHESTER	February 1985	May 1985
SYRACUSE	January 1985	April 1985
UTICA-ROME	October 1987	February 1987
NEW YORK METRO	June 1983	April 1985
RURAL SERVICE AREA 1 (Jefferson, Lewis, St. Lawrence Counties)	July 1990	April 1990
RURAL SERVICE AREA 2 (Clinton, Essex, Franklin, Fulton, Hamilton Counties)	January 1991	June 1991
RURAL SERVICE AREA 3 (Allegany, Cattaraugus, Chautauqua, Genesee, Steuben, Wyoming Counties)	November 1991	May 1991
RURAL SERVICE AREA 4 (Cayuga, Chenango, Cortland, Schuyler, Seneca, Tompkins, Yates Counties)	None	October 1991
RURAL SERVICE AREA 5 (Delaware, Otsego, Schoharie, Sullivan, Ulster Counties)	June 1990	September 1990
RURAL SERVICE AREA 6 (Columbia, Greene Counties)	May 1991	June 1991

Return on Average Equity (ROAE) of High Tech Companies
Source: Value Line Investment Survey as of 7/1/94

<u>Company</u>	<u>Industry</u>	<u>1991 ROAE</u>	<u>1992 ROAE</u>	<u>1993 ROAE</u>	<u>Forecast 1994 ROAE</u>	<u>Forecast 1995 ROAE</u>	<u>Forecast 1997-1999 ROAE</u>
BELO (A.H.) CORP	Broadcasting/Cable TV	5.38%	13.10%	13.98%	15.46%	15.80%	15.63%
CBS INC.	Broadcasting/Cable TV	-9.56%	35.02%	38.23%	23.26%	21.16%	16.35%
CAPITAL CITIES/ABC	Broadcasting/Cable TV	10.60%	10.42%	12.30%	14.76%	14.57%	13.23%
CHRIS-CRAFT	Broadcasting/Cable TV	5.54%	5.88%	11.96%	4.68%	4.92%	5.95%
SHAW COMM. 'B'	Broadcasting/Cable TV	13.71%	12.06%	11.55%	10.41%	11.32%	12.82%
TELE-COM. 'A'	Broadcasting/Cable TV	-10.81%	-2.32%	-0.49%	6.15%	9.35%	11.96%
VIACOM, INC.	Broadcasting/Cable TV	-8.86%	9.09%	18.73%	-42.99%	2.17%	11.21%
AVERAGE	Broadcasting/Cable TV	0.86%	11.89%	15.18%	4.53%	11.33%	12.45%
AST RESEARCH	Computer & Peripherals	27.19%	20.44%	12.05%	15.63%	16.54%	17.35%
AMDAHL CORP.	Computer & Peripherals	0.32%	-0.49%	-18.09%	2.16%	5.57%	12.71%
AMERICAN POWER CN	Computer & Peripherals	41.98%	45.26%	45.89%	42.25%	36.54%	28.87%
APPLE COMPUTER	Computer & Peripherals	27.24%	25.94%	13.65%	7.54%	11.72%	13.86%
APPLIED MAGN.	Computer & Peripherals	-4.01%	0.24%	4.02%	-12.61%	6.78%	18.32%
CABLETRON SYSTEMS	Computer & Peripherals	33.88%	34.00%	33.51%	27.78%	24.45%	22.65%
CISCO SYSTEMS	Computer & Peripherals	38.64%	41.77%	45.58%	47.34%	42.24%	27.66%
COMPAQ COMPUTER	Computer & Peripherals	11.77%	12.23%	19.22%	26.05%	24.32%	19.79%
CONNER PERIPH.	Computer & Peripherals	13.44%	17.20%	-32.18%	37.28%	30.00%	16.43%
CRAY RESEARCH	Computer & Peripherals	15.79%	2.49%	8.07%	8.05%	8.59%	9.48%
DATA GENERAL	Computer & Peripherals	14.49%	-3.04%	-8.46%	-13.06%	5.71%	13.42%
DELL COMPUTER	Computer & Peripherals	24.31%	29.30%	-11.12%	18.18%	16.22%	15.76%
DIGITAL EQUIP.	Computer & Peripherals	4.96%	-13.01%	-5.16%	-7.15%	2.90%	14.48%
EMC CORP	Computer & Peripherals	11.54%	19.46%	36.81%	36.26%	32.65%	26.27%
GENERAL DATACOMM	Computer & Peripherals	2.91%	4.43%	8.83%	-1.16%	5.62%	14.36%
GERBER SCIENTIFIC	Computer & Peripherals	3.47%	3.89%	4.85%	5.70%	6.50%	11.29%
HEWLETT-PACKARD	Computer & Peripherals	10.99%	11.87%	14.63%	15.64%	15.28%	15.17%
INTERGRAPH CORP.	Computer & Peripherals	9.75%	1.15%	-9.48%	-2.34%	5.77%	9.09%
INT'L BUS MACH.	Computer & Peripherals	5.28%	4.38%	0.00%	8.66%	12.10%	16.80%
KEY TRONIC	Computer & Peripherals	-7.03%	-1.25%	7.81%	-12.13%	6.40%	17.74%
MAXTOR CORP.	Computer & Peripherals	-3.99%	15.02%	-180.60%	12.90%	19.28%	18.28%
MENTOR GRAPHICS	Computer & Peripherals	-11.56%	-12.91%	-3.57%	9.24%	12.31%	12.45%
MICROPOLIS	Computer & Peripherals	4.29%	15.25%	-15.46%	-17.12%	7.22%	13.53%
NETWORK SYS. CORP	Computer & Peripherals	5.72%	6.48%	5.30%	5.19%	6.13%	12.16%
QMS	Computer & Peripherals	20.08%	-3.15%	-3.79%	3.78%	9.01%	17.29%
QUANTUM CORP.	Computer & Peripherals	15.81%	21.61%	-0.56%	17.72%	15.41%	11.56%
SCI SYSTEMS	Computer & Peripherals	6.59%	2.00%	11.01%	6.05%	10.62%	13.67%
SEAGATE TECH.	Computer & Peripherals	8.48%	10.50%	21.10%	17.20%	15.35%	13.38%
SEQUENT COMPUTER	Computer & Peripherals	-31.65%	9.88%	7.09%	11.49%	12.82%	13.89%
SILICON GRAPHICS	Computer & Peripherals	10.32%	2.37%	14.69%	17.98%	19.59%	17.47%
STANDARD MICROSYS.	Computer & Peripherals	0.65%	14.77%	14.70%	15.46%	15.65%	15.25%
STORAGE TECH.	Computer & Peripherals	12.28%	1.68%	-5.93%	2.02%	7.59%	15.06%
STRATUS COMPUTER	Computer & Peripherals	17.53%	15.57%	12.63%	13.01%	13.27%	13.74%
SUN MICROSYSTEMS	Computer & Peripherals	16.38%	12.47%	10.28%	12.05%	12.80%	11.51%
SYNOPTICS CONNTIN	Computer & Peripherals	21.10%	23.96%	31.47%	22.15%	23.49%	18.41%
TANDEM COMPUTERS	Computer & Peripherals	2.88%	3.61%	-3.06%	14.41%	16.30%	13.02%
3COM CORP.	Computer & Peripherals	7.21%	2.11%	15.66%	33.74%	37.58%	25.18%
UNISYS CORP.	Computer & Peripherals	-26.83%	31.23%	24.67%	17.91%	17.14%	18.55%
WESTERN DIGITAL	Computer & Peripherals	-52.85%	-48.92%	-20.93%	32.93%	37.45%	20.06%
AVERAGE	Computer & Peripherals	7.93%	9.74%	2.70%	12.77%	16.02%	16.31%

Return on Average Equity (ROAE) of High Tech Companies

Source: Value Line Investment Survey as of 7/1/94

<u>Company</u>	<u>Industry</u>	<u>1991 ROAE</u>	<u>1992 ROAE</u>	<u>1993 ROAE</u>	<u>Forecast 1994 ROAE</u>	<u>Forecast 1995 ROAE</u>	<u>Forecast 1997-1999 ROAE</u>
ACCLAIM ENTERTAINM	Computer Software & Svcs	-16.28%	24.50%	28.31%	32.76%	30.67%	24.71%
ADOBE SYSTEMS INC.	Computer Software & Svcs	33.73%	22.22%	21.30%	20.49%	20.45%	20.17%
AMERICAN SOFTWARE	Computer Software & Svcs	18.89%	5.28%	0.00%	7.41%	16.57%	26.17%
AUTODESK, INC.	Computer Software & Svcs	23.32%	17.98%	21.13%	20.51%	21.71%	23.22%
AUTO. DATA PROC	Computer Software & Svcs	21.38%	21.81%	21.01%	20.65%	20.41%	19.70%
BMC SOFTWARE	Computer Software & Svcs	37.75%	34.87%	33.92%	33.74%	31.74%	24.25%
BANCTEC, INC	Computer Software & Svcs	12.62%	13.07%	12.86%	13.73%	13.75%	14.39%
BOLT BERANEK	Computer Software & Svcs	9.80%	9.25%	-57.14%	-107.53%	0.00%	40.17%
BORLAND INTL	Computer Software & Svcs	-8.05%	-14.05%	-30.94%	-25.64%	19.74%	15.52%
BRODERBUND	Computer Software & Svcs	33.86%	21.55%	24.09%	21.67%	20.31%	18.97%
CHEYENNE SOFTWARE	Computer Software & Svcs	11.27%	24.56%	44.35%	46.00%	43.75%	27.06%
COMPUTER ASSOC	Computer Software & Svcs	15.92%	24.30%	33.96%	32.57%	28.14%	20.90%
COMPUTER SCIENCES	Computer Software & Svcs	11.80%	11.80%	12.06%	12.82%	13.26%	14.99%
FLSERV, INC	Computer Software & Svcs	13.57%	12.58%	11.76%	11.46%	12.57%	15.51%
GEN'I MOTORS 'E'	Computer Software & Svcs	23.35%	22.45%	21.70%	20.95%	20.27%	20.35%
INFORMIX CORP.	Computer Software & Svcs	25.15%	56.03%	31.26%	25.70%	25.00%	21.90%
LOTUS DEVELOPMENT	Computer Software & Svcs	18.40%	15.05%	15.69%	16.76%	17.41%	17.87%
MICROSOFT	Computer Software & Svcs	37.44%	45.69%	32.31%	28.88%	26.02%	23.33%
NATIONAL DATA	Computer Software & Svcs	4.85%	10.28%	8.57%	9.45%	11.60%	13.73%
NOVELL INC	Computer Software & Svcs	31.52%	31.15%	28.35%	30.34%	26.00%	24.66%
ORACLE	Computer Software & Svcs	-3.65%	15.66%	31.67%	38.63%	36.09%	28.05%
PARAMETRIC TECH	Computer Software & Svcs	26.21%	32.20%	35.71%	33.48%	30.53%	22.29%
SHL SYSTEMHOUSE	Computer Software & Svcs	2.35%	-1.30%	-3.71%	6.97%	8.48%	13.60%
SHARED MED SYS	Computer Software & Svcs	14.25%	15.35%	15.90%	17.17%	17.39%	20.09%
SOFTWARE PUB	Computer Software & Svcs	8.64%	16.50%	-32.13%	-10.42%	4.55%	18.50%
STERLING SOFTWARE	Computer Software & Svcs	10.13%	11.44%	15.53%	26.06%	19.59%	16.38%
SYBASE INC	Computer Software & Svcs	5.85%	20.13%	25.98%	24.27%	24.64%	21.26%
SYSTEM SOFTWARE	Computer Software & Svcs	26.64%	34.86%	25.15%	20.71%	21.90%	22.40%
AVERAGE	Computer Software & Svcs	16.10%	19.83%	15.31%	15.34%	20.80%	21.08%
ADVANCED MICRO	Semiconductor	16.90%	28.99%	19.76%	20.94%	19.64%	15.63%
ANALOG DEVICES	Semiconductor	2.30%	4.06%	10.62%	13.92%	16.00%	15.50%
APPLIED MATERIALS	Semiconductor	8.15%	10.11%	17.91%	23.08%	20.79%	16.18%
CIRRUS LOGIC INC	Semiconductor	17.84%	16.09%	13.45%	13.56%	13.58%	13.59%
CYPRESS SEMI	Semiconductor	11.60%	1.85%	6.90%	14.55%	17.32%	17.37%
INTEGRATED DEVICE	Semiconductor	-17.15%	4.23%	22.22%	25.69%	25.33%	17.28%
INTEL	Semiconductor	19.27%	21.06%	33.34%	28.20%	24.51%	19.05%
INT'L RECTIFIER	Semiconductor	16.64%	4.93%	-1.59%	7.39%	10.68%	12.06%
KULICKE & SOFFA	Semiconductor	-0.47%	-1773.05%	23.64%	21.07%	19.26%	14.58%
LINEAR TECH CORP	Semiconductor	20.21%	22.29%	24.47%	28.28%	29.50%	25.21%
MICRON TECHNOLOGY	Semiconductor	0.95%	1.32%	17.08%	39.93%	28.89%	18.97%
MOTOROLA	Semiconductor	10.21%	11.80%	16.92%	17.67%	17.84%	14.71%
NATIONAL SEMI	Semiconductor	-7.26%	3.54%	22.22%	29.20%	25.96%	20.86%
NOVELLUS SYST	Semiconductor	23.21%	7.48%	16.32%	20.01%	16.70%	17.85%
TERADYNE INC.	Semiconductor	6.09%	6.63%	9.01%	12.19%	12.41%	10.41%
TEXAS INSTR.	Semiconductor	-12.86%	15.14%	22.58%	26.35%	24.25%	18.82%
VLSI TECHNOLOGY	Semiconductor	6.20%	-10.30%	7.75%	15.35%	19.35%	16.24%
AVERAGE	Semiconductor	7.17%	-95.52%	16.62%	21.02%	20.12%	16.72%
ADC TELECOMM INC	Telecom Equipment	15.17%	12.39%	15.70%	15.60%	16.02%	14.99%
ANDREW CORP	Telecom Equipment	10.51%	11.27%	14.12%	15.56%	14.32%	14.11%
COBRA ELECTRONICS	Telecom Equipment	-14.83%	-28.57%	-14.23%	2.92%	6.90%	13.07%
DSC COM'ICATIONS	Telecom Equipment	-47.42%	5.92%	18.84%	18.23%	19.97%	18.49%
GANDALF TECH	Telecom Equipment	-13.94%	-43.51%	-41.45%	-15.87%	3.39%	14.23%
PORTA SYSTEMS	Telecom Equipment	15.92%	-4.39%	-16.65%	5.91%	10.20%	13.13%
AVERAGE	Telecom Equipment	-5.76%	-7.81%	-3.95%	7.06%	11.80%	14.67%
AVERAGE - ALL INDUSTRIES		8.80%	-6.73%	9.27%	14.01%	17.52%	17.38%

STATE OF NEW YORK
PUBLIC SERVICE COMMISSION

Appendix III p.
Dicomm

At a session of the Public Service
Commission held in the City of
New York on May 12, 1993

COMMISSIONERS PRESENT:

Lisa Rosenblum, Deputy Chairperson
Harold A. Jerry, Jr.
William D. Cotter
Raymond J. O'Connor

CASE 92-C-0440 - Proceeding on Motion of the Commission as to the
Complaint of DICOMM Cellular, L.P. against
Genesee Telephone Company for Failure to Enter
into a Non-Discriminatory Roaming Agreement.

**ORDER INSTITUTING PROCEEDING,
DIRECTING PARTIES TO SHOW CAUSE AND
DIRECTING THE INSTITUTION OF AN
INTERIM ROAMING ARRANGEMENT**

(Issued and Effective June 22, 1993)

BY THE COMMISSION:

BACKGROUND

DICOMM Cellular, L.P. (DICOMM), a non-wireline cellular carrier located in the western part of the state, has filed a complaint that Genesee Telephone Company (Genesee), a non-wireline cellular carrier with a cellular service area adjacent to DICOMM's, has unreasonably withheld agreement to a bilateral roaming arrangement. For over a year, Department of Public Service staff (staff) attempted to facilitate negotiations

between the two companies, but the parties have been unable to reach a mutually satisfactory roaming agreement which would permit cellular customers of each company to make or receive calls conveniently while traveling outside their home service areas.

Cellular service territories are divided into service areas known as Rural Service Areas (RSAs) or Metropolitan Service Areas (MSAs), with each area typically served by at least two carriers on frequencies assigned by the Federal Communications Commission. Usually, one carrier in each area is affiliated with a local exchange company (referred to as the landline carrier) and one is a non-wireline carrier. DICOMM, the non-wireline carrier in RSA #3¹ is a relatively new entrant serving an RSA. Genesee is the non-wireline carrier serving the Rochester MSA, which borders portions of DICOMM's service area.

The landline and non-wireline carriers operate on different sets of frequencies. When a subscriber to one carrier leaves the "home area," that subscriber's calls are picked up by the same type carrier (either landline or non-wireline) authorized to provide service in the area in which the subscriber is traveling. Because these calls are picked up on the same

1. DICOMM's service territory includes six counties in western New York. The northernmost county in DICOMM's territory includes a highly traveled section of the New York State Thruway, bordered on both sides by Genesee service territory, which is the main point of contention in dispute.

frequency that the subscriber's home carrier uses, it is important that adjacent cellular carriers with similar frequencies have in place roaming agreements.

In general, where there is no automatic roaming agreement between adjacent cellular carriers, customers are still able to make "roaming" calls, but they must arrange for billing in advance with the carrier in whose territory they will be roaming or make credit card arrangements with an operator at the time they make the call. Also, because of other agreements between cellular carriers, cellular customers have generally been able to make emergency "911" calls and "611" calls to a customer service operator. Recently, however, DICOmm filed a supplemental complaint alleging that Genesee had begun a deliberate effort to reprogram its customers' cellular telephones to block access to DICOmm's system entirely (and to block access to the wireline carrier operating in RSA #3 as well). Consequently, cellular customers of Genesee traveling in RSA #3 are unable to complete any calls, including calls to "911" emergency services. Genesee admitted that the essential facts alleged were true, although it offered to advise its customers about how to reprogram their phones so that emergency service could be received through the wireline carrier (although not DICOmm).

The Parties' Positions

Although the paperwork filed in this proceeding is voluminous, the parties' positions have been relatively constant.

DICOMM requests a "non-discriminatory, bi-directional roaming agreement" at a standard rate. Originally, DICOMM proposed a rate of \$0.70 per minute, but it has been willing to move downward from that rate. Genesee says that it would like to enter a roaming agreement with DICOMM, but insists that it will pay no more than \$0.32 per minute, the rate between the similarly located landline cellular carriers in the area. Genesee has not been willing to deviate from the rate it states it needs to remain competitive with the landline cellular carriers.

Staff's Proposals

In the course of attempting to reconcile the differences between DICOMM and Genesee, staff proposed a number of alternatives, including, for example, unbundling of billing and collection services and a sliding rate scale based on minutes of use, with a compensation level starting at \$0.52 per minute and ending at \$0.32 per minute based upon an increasing total of monthly roaming minutes. The rate structure proposed by staff is attached to this order as Appendix 1. In each case, DICOMM has been willing to accept staff's proposals, while Genesee has declined.

Staff, after the extended attempts to assist the parties to reach a mutually satisfactory agreement, has concluded that such an agreement will not be reached without Commission intervention. Furthermore, staff is concerned that Genesee's recent actions threaten the public's interest in safe, reliable

and adequate telephone service in New York State. To that end, staff has recommended that the parties be directed to enter an interim roaming arrangement, and that Genesee be directed immediately to unblock access to "911" and "611" when its customers roam in RSA #3. Furthermore, staff believes a formal proceeding should be instituted at which Genesee and DICOMM should be required to show cause why they should not be required to enter into a bilateral automatic roaming arrangement at the compromise tapered compensation schedule proposed by staff.

DISCUSSION

In general, cellular companies have been lightly regulated by this Commission. In Opinion 89-12,¹ the Commission determined that, because each cellular service territory has two serving companies -- the landline and the non-wireline -- competition could be relied upon to substitute for regulation. However, the Commission retained the discretion to impose the stricter regulation permitted by the Public Service Law should it appear necessary.

In this instance, the lack of agreement after lengthy discussions, Genesee's unwillingness to agree to or suggest alternatives which would lead to a bilateral roaming arrangement

¹. Case 29469 - Telecommunications Industry - Regulatory Policies for Competitive Industry Segments, Opinion No. 89-12, issued May 16, 1989.

with DICONM, and the size disparity between Genesee (a large cellular company) and DICONM (a much smaller one) suggest that competition for cellular service, in this area at least, is not sufficiently intense or efficient to function as a substitute for regulation.

Furthermore, Genesee's latest actions to program its new cellular units to block access to DICONM when its customers are traveling in or near RSA #3, including blocking "911" and "611" calls, raises substantial concerns about the safety and security of Genesee customers roaming in DICONM's service area which are serious enough to warrant Commission intervention before a tragedy or disaster strikes an unsuspecting and unprepared customer roaming in RSA #3. It is noteworthy that Genesee never informed staff of its blocking actions, and implied throughout the discussions that calls from roamers, including emergency "911" calls, could be completed in the normal, albeit non-automatic, manner.

In the changing telecommunications environment, interoperability and interconnection are becoming increasingly significant, and the public's interest in unimpeded communications must be ensured. Where, as here, companies cannot resolve these issues, it is necessary for the Commission to act.

A formal proceeding will therefore be instituted, pursuant to Section 96 of the Public Service Law, which authorizes investigation of "any act done or omitted to be done by any... telephone corporation," as well as pursuant to the